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REMARKS

Claims 1-20 are pending in the present application. Reconsideration is respectfully requested for the following reasons.

Claims 1-20 have been rejected under 35 U.S.C. §112, second paragraph, for failing to particularly point out and distinctly claim the subject matter which Applicant regards as the invention. According to the Office Action, the term "its" does not define the metes and bounds of the invention. Applicants submit that pronouns are not inherently indefinite and claims 1 and 11 clearly define the "it" as being the vehicle control implementation subsystem. Nevertheless, claims 1 and 11 have been amended to change the pronoun to the noun. Accordingly, Applicants submit that the scope of claim 1 has not changed with this amendment. Furthermore, according to the Office Action, "[a]s per claim 1, it is unclear what it stated by the Applicant (lines 2 and 12)?" Since this is a question, Applicants are unsure if this is a rejection of claim 1 and, if so, what exactly is unclear about the language used in the claim. Applicants submit that claim 1 is clear as written and requests the Examiner to provide a full explanation in subsequent Office Actions. Accordingly, Applicants submit that claims 1-20 are definite.

Claims 2-5 and 12-15 have not been rejected over prior art. Accordingly, Applicants submit that claims 2-5 and 12-15 are in condition for allowance and a Notice of such is respectfully requested in the next Office Action.

Claims 1 and 11 have been rejected under 35 U.S.C. §102(b) as being anticipated by U.S. Patent No. 5,794,735 to Sigl. In proceedings before the Patent and Trademark Office, the Examiner bears the burden of establishing a prima facie case of anticipation based upon the prior art. *In re Sun*, 31 USPQ 2d 1451, 1453 (Fed. Cir. 1993) (unpublished). Applicants respectfully assert that the Examiner has not yet met her burden of establishing a prima facie case of anticipation with respect to the rejected claims. Applicants note that 37 C.F.R. §1.104(c)(2) states that:

When a reference is complex or shows or describes inventions other than that claimed by the applicant, the particular part relied on must be designated as nearly as practicable. The pertinence of each reference, if not apparent, must be clearly explained in each rejected claim specified.

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Claim 1 defines a method of controlling a vehicle including, among other things, providing a driver subsystem and an active assist subsystem, receiving at least one driver input into the driver subsystem from a driver of the vehicle, outputting a driver output from the driver subsystem to the active assist subsystem, with the driver output being derived from the at least one driver input, providing at least one active assist program having at least one active input, with the at least one active assist program having an on setting wherein the at least one active assist program outputs at least one active input and an off setting wherein the at least one active assist program does not output at least one active input, providing a vehicle control and implementation subsystem, and inputting an intended driving demand from the active assist program into the vehicle control and implementation subsystem, wherein the intended driving demand is derived from a combination of the at least one driver input and the at least one active input if the at least one active assist program is in the on setting and if the driver of the vehicle does not overrule the at least one active assist program, otherwise the intended driving demand is derived from the at least one driver input, such that the vehicle control and implementation subsystem cannot determine if instructions for the vehicle control and implementation system come from the at least one driver input or the at least one active assist program. [The prior art of record does not disclose or suggest the above noted features of claim 1.

Applicants submit that the Sigl '735 patent does not disclose all of the features of claim 1. According to the Office Action, the Sigl '735 patent discloses a driver subsystem, an active assist subsystem and a vehicle control and implementation subsystem in the abstract. The Sigl '735 patent only discloses a first control unit and a second control unit in the abstract. The first control unit and the second control unit are identified as elements 10 and 24 in Fig. 1. Applicants submit that the first control unit 10 and the second control unit 24 as disclosed in the Sigl '735 patent could not be a driver subsystem, an active assist subsystem and a vehicle control and implementation subsystem as claimed. Furthermore, Applicant submits that the Sigl '735 patent does not include the driver subsystem and active assist subsystem or a vehicle control and implementation subsystem communicating with each other as defined in claim 1. Finally, Applicants request that the Examiner define the particular part as disclosed in the Sigl

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'735 patent used to reject the elements of the claims and clearly explain how the parts of the Sigl '735 patent interact as required by 37 C.F.R. §1.104(c)(2). Accordingly, Applicants submit that claim 1 is in condition for allowance. Furthermore, claims 2-10 depend from claim 1, and since claim 1 defines unobvious patentable subject matter, claims 2-10 define patentable subject matter.

Claim 11 defines a vehicle control system including, among other things a driver subsystem receiving at least one driver input from a driver of the vehicle, the driver subsystem including a driver output outputting a driver output signal, the driver output signal being derived from the at least one driver input, an active assist subsystem including an assist input receiving the driver output signal from the driver output of the driver subsystem, the active assist subsystem including at least one active assist program having at least one active input, the at least one active assist program having an on setting wherein the at least one active assist program outputs at least one active input and an off setting wherein the at least one active assist program does not output at least one active input, the at least one active assist subsystem including an assist output, a vehicle control and implementation subsystem having a control input receiving an intended driving demand from the assist output of the active assist program, wherein the intended driving demand is derived from a combination of the at least one driver input and the at least one active input if the at least one active assist program is in the on setting and if the driver of the vehicle does not overrule the at least one active assist program, otherwise the intended driving demand is derived from the at least one driver input, such that the vehicle control and implementation subsystem cannot determine if instructions for the vehicle control and implementation system come from the at least one driver input or the at least one active assist program. The prior art of record does not disclose or suggest the above noted features of claim 11.

Applicants submit that the Sigl '735 patent does not disclose all of the features of claim 11. According to the Office Action, the Sigl '735 patent discloses a driver subsystem, an active assist subsystem and a vehicle control and implementation subsystem in the abstract. The Sigl '735 patent only discloses a first control unit and a second control unit in the abstract. The first control unit and the second control unit are identified as elements 10 and 24 in Fig.

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1. Applicants submit that the first control unit 10 and the second control unit 24 as disclosed in the Sigl '735 patent could not be a driver subsystem, an active assist subsystem and a vehicle control and implementation subsystem as claimed. Furthermore, Applicant submits that the Sigl '735 patent does not include the driver subsystem and active assist subsystem or a vehicle control and implementation subsystem communicating with each other as defined in claim 11. Finally, Applicants request that the Examiner define the particular part as disclosed in the Sigl '735 patent used to reject the elements of the claims and clearly explain how the parts of the Sigl '735 patent interact as required by 37 C.F.R. §1.104(c)(2). Accordingly, Applicants submit that claim 11 is in condition for allowance. Furthermore, claims 12-20 depend from claim 11, and since claim 11 defines unobvious patentable subject matter, claims 12-20 define patentable subject matter.

Claims 10 and 20 have been rejected under 35 U.S.C. §103(a) as being unpatentable over the Sigl '735 patent in view of U.S. Patent No. 4,828,283 to Ishii et al. The requirements for making a *prima facie* case of obviousness are described in MPEP §2143 as follows:

To establish a *prima facie* case of obviousness, three basic criteria must be met. First, there must be some suggestion or motivation, either in the references themselves or in the knowledge generally available to one of ordinary skill in the art, to modify the reference or to combine reference teachings. Second, there must be a reasonable expectation of success. Finally, the prior art reference (or references when combined) must teach or suggest all the claim limitations.

The teaching or suggestion to make the claimed combination and the reasonable expectation of success must both be found in the prior art, and not based on applicant's disclosure. *In re Vaeck*, 947 F.2d 488, 20 USPQ2d 1438 (Fed. Cir. 1991).

MPEP §2143.01 provides further guidance as to what is necessary in showing that there was motivation known in the prior art to modify a reference teaching. Specifically, MPEP §2143.01 states:

The mere fact that references can be combined or modified does not render the resultant combination obvious unless the prior art also suggests the desirability

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of the combination. *In re Mills*, 916 F.2d 680, 16 USPQ2d 1430 (Fed. Cir. 1990).

A statement that modifications of the prior art to meet the claimed invention would have been 'well within the ordinary skill of the art at the time the claimed invention was made,' because the references relied upon teach all aspects of the claimed invention were individually known in the prior art is not sufficient to establish a *prima facie* case of obviousness without some objective reason to combine the teachings of the references. *Ex parte Levengood*, 28 USPQ2d 1300 (Bd. Pat. App. & Inter. 1993).

In proceedings before the Patent and Trademark Office, the Examiner bears the burden of establishing a *prima facie* case of obviousness based upon the prior art. *In re Fritch*, 23 USPQ 2d 1780, 1783 (Fed. Cir. 1992); M.P.E.P. §2142. Applicants respectfully assert that the Examiner has not yet met the Examiner's burden of establishing a *prima facie* case of obviousness with respect to the rejected claims. Consequently, the Examiner's rejection of the subject claims is inappropriate, and should be withdrawn.

In regard to the first criterion of obviousness, there is no suggestion-or-motivation either in the references themselves or in the knowledge generally available to one of ordinary skill in the art, to combine the reference teachings. According to the Office Action, the Sigl '735 patent discloses inputting an intended driving demand from the active assist program into the vehicle control subsystem on lines 60-67 of column 2. Lines 60-67 of column 2 of the Sigl '735 patent discloses that the first control unit 10 generates a trigger signal for the final controlling element 14, which influences the power output. There is no suggestion or motivation for providing a wheel angle demand to a device or devices 14 for controlling an engine output of an internal combustion engine because a device for controlling an engine output cannot affect a wheel angle. Therefore, such a combination could not be used to control a motor vehicle. Accordingly, claims 10 and 20 are in condition for allowance.

Claims 8 and 18 have been rejected under 35 U.S.C. §103(a) as being unpatentable over the Sigl '735 patent in view of U.S. Patent No. 5,927,421 to Fukada. The requirements for making a *prima facie* case of obviousness are discussed above.

In regard to the first criterion of obviousness, there is no suggestion or motivation either in the references themselves or in the knowledge generally available to one of ordinary

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skill in the art, to combine the reference teachings. According to the Office Action, the Sigl '735 patent discloses inputting an intended driving demand from the active assist program into the vehicle control subsystem on lines 60-67 of column 2. Lines 60-67 of column 2 of the Sigl '735 patent discloses that the first control unit 10 generates a trigger signal for the final controlling element 14, which influences the power output. There is no suggestion or motivation for providing a yaw rate demand to a device or devices 14 for controlling an engine output of an internal combustion engine because a device for controlling an engine output cannot affect a yaw rate. Therefore, such a combination could not be used to control a motor vehicle. Moreover, in regard to the third criterion of obviousness, the combination as made by the Office Action would not include all of the limitations of the claims. According to the Office Action, the combination includes a wheel angle as in the intended driving demand. However, claims 8 and 18 define the intended driving demand as including a yaw rate demand. Accordingly, claims 8 and 18 are in condition for allowance.

Claims 9 and 19 have been rejected under 35 U.S.C. §103(a) as being unpatentable over the Sigl '735 patent in view of U.S. Patent No. 5,822,709 to Fujita. The requirements for making a *prima facie* case of obviousness are discussed above.

In regard to the first criterion of obviousness, there is no suggestion or motivation either in the references themselves or in the knowledge generally available to one of ordinary skill in the art, to combine the reference teachings. According to the Office Action, the Sigl '735 patent discloses inputting an intended driving demand from the active assist program into the vehicle control subsystem on lines 60-67 of column 2. Lines 60-67 of column 2 of the Sigl '735 patent discloses that the first control unit 10 generates a trigger signal for the final controlling element 14, which influences the power output. There is no suggestion or motivation for providing a slip angle demand to a device or devices 14 for controlling an engine output of an internal combustion engine because a device for controlling an engine output cannot affect a slip angle. Therefore, such a combination could not be used to control a motor vehicle. Accordingly, claims 9 and 19 are in condition for allowance.

Accordingly, claims 1-20 are in condition for allowance and a Notice of Allowability is therefore earnestly solicited.

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Attached hereto is a marked-up version of the changes made to the specification and claims by the current amendment. The attached page is captioned "Version With Markings to Show Changes Made."

Respectfully submitted,

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VERSION WITH MARKINGS TO SHOW CHANGES MADE

In the Claims:

Claims 1 and 11 have been amended as follows.

1. (Amended) A method of controlling a vehicle comprising:

2. providing a driver subsystem and an active assist subsystem;
receiving at least one driver input into the driver subsystem from a driver of the vehicle;

outputting a driver output from the driver subsystem to the active assist subsystem, the driver output being derived from the at least one driver input;

providing at least one active assist program having at least one active input, the at least one active assist program having an on setting wherein the at least one active assist program outputs at least one active input and an off setting wherein the at least one active assist program does not output at least one active input;

providing a vehicle control and implementation subsystem; and
inputting an intended driving demand from the active assist program into the vehicle control and implementation subsystem;

wherein the intended driving demand is derived from a combination of the at least one driver input and the at least one active input if the at least one active assist program is in the on setting and if the driver of the vehicle does not overrule the at least one active assist program, otherwise the intended driving demand is derived from the at least one driver input, such that the vehicle control and implementation subsystem cannot determine if [its] instructions for the vehicle control and implementation system come from the at least one driver input or the at least one active assist program.

11. (Amended) A vehicle control system comprising:

a driver subsystem receiving at least one driver input from a driver of the vehicle, the driver subsystem including a driver output outputting a driver output signal, the driver output

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signal being derived from the at least one driver input;

an active assist subsystem including an assist input receiving the driver output signal from the driver output of the driver subsystem, the active assist subsystem including at least one active assist program having at least one active input, the at least one active assist program having an on setting wherein the at least one active assist program outputs at least one active input and an off setting wherein the at least one active assist program does not output at least one active input, the at least one active assist subsystem including an assist output;

a vehicle control and implementation subsystem having a control input receiving an intended driving demand from the assist output of the active assist program;

wherein the intended driving demand is derived from a combination of the at least one driver input and the at least one active input if the at least one active assist program is in the on setting and if the driver of the vehicle does not overrule the at least one active assist program, otherwise the intended driving demand is derived from the at least one driver input, such that the vehicle control and implementation subsystem cannot determine if [its] instructions for the vehicle control and implementation system come from the at least one driver input or the at least one active assist program.